



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE

United States Patent and Trademark Office

Address: COMMISSIONER FOR PATENTS

P.O. Box 1450

Alexandria, Virginia 22313-1450

www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/735,260	12/11/2003	Colin Whitby-Stevens	APPLE.049A	9784
65201 7590 08/27/2008 GAZDZINSKI & ASSOCIATES, P.C. 11440 WEST BERNARDO COURT SUITE 375 SAN DIEGO, CA 92127				
EXAMINER				
ABRAHAM, ESAW T				
ART UNIT		PAPER NUMBER		
2112				
MAIL DATE		DELIVERY MODE		
08/27/2008		PAPER		

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/735,260

Applicant(s)

WHITBY-STREVS ET AL.

Examiner

ESAW T. ABRAHAM

Art Unit

2112

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 06 June 2008.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 57-73 is/are pending in the application.
- 4a) Of the above claim(s) 74-100 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 57-73 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 11 December 2003 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-8508)
- Paper No(s)/Mail Date _____

- 4) ☐ Interview Summary (PTO-413)
- Paper No(s)/Mail Date _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

DETAILED ACTION

Election/Restrictions

Applicant's election with traverse of Group I (including claims 57-73) in the reply filed on 06/06/08 is acknowledged. The traversal is on the ground(s) that "it would not present a serious burden for the Examiner to examine Groups I and III (claims 82-100) together with the claims of Group I" is not found persuasive because while Group I is about a method of encoding first and second streams of data, Group III is about a method of creating first and second streams of data and would require a different and additional search in 714/752 (and additional 870 patents). The Applicant is invited to view the extensive search that was performed for Group III. Therefore, the restriction requirement is proper.

1. Claims **57-73** are presented for examination.

Election Restriction

2. Applicant's election with traverse of Group I, claims 57-73, in the Paper filed 06/06/08 is acknowledged.

Oath Declaration

3. The oath/declaration filed on 05/24/04 is acceptable.

Information Disclosure Statement

4. The Information Disclosure Statements filed on 05/24/089, 05/26/04 and 10/28/04 have been considered.

Drawings

5. The drawings filed on 12/11/03 are objected to because:

The **informal drawings** (see figures 4-8) filed in this application are acceptable for examination purposes. When the application is allowed, applicant will be required to submit new formal drawings.

The informal drawings are not of sufficient quality to permit examination. Accordingly, replacement drawing sheets in compliance with 37 CFR 1.121(d) is required in reply to this Office action. The replacement sheet(s) should be labeled "Replacement Sheet" in the page header (as per 37 CFR 1.84(c)) so as not to obstruct any portion of the drawing figures. If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. Applicant is given a TWO MONTH time period to submit new drawings in compliance with 37 CFR 1.81. Extensions of time may be obtained under the provisions of 37 CFR 1.136(a). Failure to timely submit replacement drawing sheets will result in ABANDONMENT of the application.

Specification

6. The specification is objected to because:

The arrangement of the specification is not in accordance with the guidelines noted above.

- Remove the first paragraph, "This Application is submitted in the names of Inventors Colin Whitby-Stevens, and Jerrold V. Hauck, assignors to Apple Computer, Inc. a California Corporation" from the disclosure (see page 1).

- Heading for each section of specification should be provided, for example, "Cross reference to related application" and "Brief Description of the Several Views of the Drawing(s)".

The lengthy specification has not been checked to the extent necessary to determine the presence of all possible minor errors. Applicant's cooperation is requested in correcting any errors of which applicant may become aware in the specification.

Appropriate correction is required.

Claim Objections

7. Claims 57-73 are objected to because of the following informalities:

Claim 57 recites, "said symbol are adapted to indicate a symbol type" since "adapted to" only suggests or makes optional, the term "adapted to" fails to further limit the claim. Further, the word **"adapted to"** raises a question as to the limiting effect of the language in a claim. Claim scope is not limited by claim language that suggests or makes optional but does not require steps to be performed, or by claim language that does not limit a claim to a particular structure. See MPEP 2111.93 [R-3].

Claim 57 recites "a symbol type" however exactly which symbol type is being referred to here?

Claim 64, "symbol subtype comprises one of (i) a control symbol, and (ii) an arbitration request symbol" should recite ---symbol subtype comprises one of (i) a control symbol, or (ii) an arbitration request symbol---.

Claim 68 recites, "...a first module is adapted to encode a symbol.....a second module adapted to transmit..." since "adapted to" only suggests or makes optional, the term "adapted to" fails to further limit the claim. Further, the word **"adapted to"** raises a question as to the limiting effect of the language in a claim. Claim scope is not limited by claim language that

suggests or makes optional but does not require steps to be performed, or by claim language that does not limit a claim to a particular structure. See MPEP 2111.93 [R-3].

Claim 68 recites "a symbol type" however exactly which symbol type is being referred to here?

Claims 58-67 and 69-73 are at least objected for their dependencies, directly or indirectly, on the objected claims 57 and 68 above.

Correction is required.

Claim Rejections - 35 USC § 112, 2nd

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

8. Claims **57-73** are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim **57** recites, "a most significant bit and a least significant bit of said symbol are adapted to indicate a symbol type". It is unclear how the most significant bit and the least significant bit affect the symbol to indicate a symbol type. For example, the symbol type could be indicated only if the most significant bit and the least significant bit satisfy a certain condition.

Further, it is unclear how the reliability of transmitting data increases by only indicating a symbol type since there must be some mechanism or techniques such as "detecting, checking, correcting or inverting" the bits within the symbol for increasing the reliability.

Claim 68 recites, "the first module is adapted to indicate a symbol type by setting or resetting both a most significant bit and a least significant bit of said symbol. It is unclear how most significant bit and a least significant bit of said symbol affect the symbol to indicate a symbol type. For example, the symbol type could be indicated only if the most significant bit and the least significant bit satisfy a certain condition.

Claims 58-67 and 69-73 are at least rejected for their dependencies, directly or indirectly, on the rejected claims 57 and 68 above.

Appropriate correction and/or clarification are requested.

Claim Rejections - 35 USC § 101

35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

9. Claims 68-73 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

Although the preamble of independent claims 68 calls for a system, the claim combination recites "a first module adapted to encodea second module adapted to transmit..." electronic form and source codes which are not process, machine, manufacture or composition of matter and thus claim 68 is non-statutory as the body of the claim is directed toward "software per se".

Claims 69-73 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non- statutory subject matter.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S. C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(b) The invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

10. Claims **57-73** are rejected under 35 U.S.C. 102(b) as being clearly anticipated by Brief et al. (U.S. PN: 5,875,210) "hereinafter as Brief".

As per claim 57:

Brief substantially teaches a method of reliably transmitting data across a communication medium (see col. 1, lines 37-40) comprising encoding a symbol comprising a plurality of bits, wherein a most significant bit and a least significant bit of said symbol are adapted to indicate a symbol type and transmitting the symbol across the communication medium; wherein said encoding increases the reliability Of said transmitting data (see col. 2, lines 54-60, col. 11, lines 17-67 and col. 16, lines 6-67 to col. 17, lines 1-67).

As per claim 58:

Brief in view of the above rejection teaches wherein the symbol is encoded with said most significant bit identical to said least significant bit (see col. 16, lines 6-67 to col. 17, lines 1-67).

As per claim 59:

Brief in view of the above rejection teaches wherein the symbol consists of eight bits (see col. 16, lines 6-67 to col. 17, lines 1-67).

As per claims 60:

Brief in view of the above rejection teaches wherein the symbol type corresponds to either a first type or a second type (see col. 16, lines 6-67 to col. 17, lines 1-67)

As per claims 61-65:

Brief in view of the above rejection teaches wherein if said most significant bit and said least significant bit both comprise a high bit, the symbol type corresponds to one of the first and second type, and if the most significant bit and the least significant bit of the symbol both comprise a low bit, the symbol type corresponds to the other of the first and second types (see col. 2, lines 54-60, col. 11, lines 17-67 and col. 16, lines 6-67 to col. 17, lines 1-67).

As per claims 66 and 67:

Brief in view of the above rejection teaches wherein said communication medium comprises a bus compliant with a high-speed serialized bus protocol (see col. 1, lines 17-21 and col. 19, lines 1-7).

As per claim 68:

Brief substantially teaches a computerized apparatus (see col. 1, lines 37-40) for transmitting data across a communication medium, said apparatus comprising a first module adapted to encode a symbol comprising a plurality of bits, wherein the first module is adapted to

indicate a symbol type by setting or resetting both a most significant bit and a least significant bit of said symbol; and a second module adapted to transmit the encoded symbol across the communication medium (see col. 2, lines 54-60, col. 11, lines 17-67 and col. 16, lines 6-67 to col. 17, lines 1-67).

As per claims 69-71:

Brief in view of the above rejection teaches wherein the symbol type corresponds to either a first type or a second type; wherein if the most significant bit and the least significant bit of the symbol are both set, the symbol type corresponds to the first type, and if the most significant bit and the least significant bit of the symbol are both reset, the symbol type corresponds to the second type (see col. 2, lines 54-60, col. 11, lines 17-67 and col. 16, lines 6-67 to col. 17, lines 1-67).

As per claims 72 and 73:

Brief in view of the above rejection teaches wherein said communication medium comprises a bus compliant with a high-speed serialized bus protocol (see col. 1, lines 17-21 and col. 19, lines 1-7).

Conclusion

11. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Esaw T. Abraham whose telephone number is (571) 272-3812. The examiner can normally be reached on M-F 8am-4PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jacques Louis-Jacques can be reached on (571) 272-6962. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/EA/

/Esaw T Abraham/

Examiner, Art Unit 2112

08/19/08